Reliable and Valid Experiment Notes

* **What does reliable mean?**
  + \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ you can trust.
  + If someone else did the same experiment they would get the \_\_\_\_\_\_\_\_\_\_\_\_\_\_ \_\_\_\_\_\_\_\_\_\_\_\_\_.
  + You evidence will be \_\_\_\_\_\_\_\_\_\_\_\_\_ \_\_\_\_\_\_\_\_\_\_\_\_\_\_if you repeat your findings.
* **Reliable or Not Reliable?**
  + Daniel recorded the amount of time it took the M&M to dissolve 3 times and then averaged the times.
    - **Yes or No (Circle one)**
  + Ashley recorded the amount of time it took the M&M to dissolve 1 time.
    - **Yes or No (Circle one)**
  + Michael recorded the amount of time it took the M&M to dissolve 3 times and then averaged the times. He then had Sam do the same thing. They got very similar results.
    - **Yes or No (Circle one)**
* **What does valid mean?**
  + Valid is evidence that is \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ and \_\_\_\_\_\_\_\_\_\_\_\_\_\_ to the question being investigated
* **Valid or not Valid?**
  + Question: How does the amount of sunlight a plant receives affect the number of blooms on a plant?
  + Recording how tall the plant is each day
    - **Yes or No (Circle one)**
  + Recording the number of blooms
    - **Yes or No (Circle one)**
* How do you make sure your investigation is reliable and valid?
  + Your experiment has all the correct parts
    - \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_
    - \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_
    - \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_
    - \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_
  + You use \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_in your investigation
  + Your experiment can be \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_by another scientist and they get \_\_\_\_\_\_\_\_\_\_\_\_\_ results